

Department of Public Works

MEMORANDUM

Date: 10/4/2017

To: City Manager's Office

From: Chris Dunnaway, Principal Stormwater Engineer

RE: Jordan Creek Renewal Phase I

Improvements to Jordan Creek through Center City have long been needed to address severe flooding problems that have plagued this area for decades. The "daylighting" of Jordan Creek would not only reduce flooding, it would also help us meet our mandated requirements for improving stormwater quality. It is also key to the economic vitality of the downtown area.

The Jordan Valley area has seen significant economic development over the past few years, with the development of Brick City, Jordan Valley Innovation Center (JVIC), the eFactory, and other significant developments. Reducing the flooding problems and enhancing the appearance of this area is key to continuing this growth and the well-paying jobs these projects bring to the community.

Improving Jordan Creek poses significant challenges, both technically and financially. Between 2002 and 2009, the City, with the assistance of then-Congressman Roy Blunt, sought and received Federal funds for the U.S. Army Corps of Engineers to conduct detailed flood studies and prepare construction cost estimates. The Corps estimated approximately \$65 million for construction of regional detention basins to reduce flood flow rates as well as to construct channel and bridge improvements to improve capacity for conveying flood flows, including the area from Grant Avenue upstream to Fremont Avenue.

Following completion of these studies, the City pursued opportunities for Federal funds to assist with the costs of construction. Funding through the Corps of Engineers is predicated upon meeting strict criteria established by the Corps for benefits vs. cost.

In 2014, the Corps completed their benefit-cost analysis and determined that the Center City portion of Jordan Creek did not meet their criteria for funding. Other funding options have become very limited as Federal and State budgets have been reduced. The City remains committed to the project and is still pursuing all funding opportunities.

Earlier this year, two concurrent factors converged that appeared to make an initial phase of the Jordan Creek project immediately viable:

- The proposed expansion of JVIC by Missouri State University in partnership with a private development made a one-block area potentially available for private development and improvements to the creek.
- A change in interpretation by the Department of Housing & Urban Development (HUD)
 caused the City to identify construction projects that could be designed and constructed
 by Spring 2018.

To take advantage of this opportunity the City included \$1.5 million of the reallocated HUD funds for construction of an initial phase of improvements to Jordan Creek. Due to the extremely tight time frame, the City decided to proceed with preliminary design of the creek channel by utilizing funds from the ¼-cent Capital Improvements Sales Tax. The City contracted with Olsson Associates, who had previously worked on other preliminary studies for Jordan Creek.

Over the summer months, engineers and designers from the Olsson team have worked on a concept plan for improvements to the creek from Grant Avenue east to Kimbrough Avenue. These plans considered a wider area than the proposed initial construction phase in order that any constructed improvements would be done in proper context with future phases. We expect to receive the final report from the consultant by mid-November. Total expenses for the study are expected to be approximately \$44,500. We will share the consultant's report, including the conceptual plans with the Council at that time.

As the study has progressed, it has become apparent that it will not be possible to complete construction of the creek improvements within the time dictated by HUD. We will therefore work with Missouri State University and the developer on other solutions for stormwater conveyance that will not require HUD funding.